and then digested, or the order be reversed. Five analyses were made. No. 1, for example, gives:

C.,	56.11
H.,	7.33
N.,	14.32
S.,	1.88
Ash,	1.21

Neurokeratin, therefore, does not contain phosphorus; and sulphur is the most variable constituent, the percentage in one analysis reaching 2.24. Compared with keratin from the hair of a rabbit, it also shows a decided difference in composition, principally in sulphur, which in the keratin, reaches 4.02. An interesting point is, that the examination of the central nervous system of the lobster showed the analogous insoluble substance to consist of chitin. A study of the quantitative distribution of neurokeratin shows the white matter of the brain to be richest in it, and to have some nine times as much as either the gray matter or the peripheral nerves. The second contribution treats of the histological detection of neurokeratin, pointing out some of the differences between the frog, fish and mammals (rabbits), and concluding that the double sheath joined by cross bands which is found after the treatment of the nerve fibers, represents the neurokeratin framework of the sheath of Schwann, the axis cylinder sheath and the medullary substance.

(The paper is very valuable from the full descriptions of all methods used—something which was much needed. The statements as to the structures which may represent the neurokeratin in the cortex, and the white matter of the central nervous system are, however, suggestive rather than conclusive. REV.)

Ueber eine neue Färbungsmethode des centralen Nervensystems und deren Ergebnisse bezüglich des Zusammenhangen von Ganglienzellen und Nervenfasern. PAUL FLECHSIG. Archiv f. Physiologie, Heft 5 und 6, 1889. 1 Tafel.

The plate accompanying this short communication is very instructive. The difficulty with the cells, as brought out by Golgi's method, has been heretofore that no connection between them and the medullated fibers was demonstrated. In this case, specimens treated by Golgi's bichloride of mercury method were further treated with an extract of Japanese redwood, ("*Japanischer Rothholz*"—further information as to what plant is meant by this commercial term is not given). For the details of the method, which is complicated, the reader is referred to the original. By the treatment the nerve fibers are all colored red, the cells and their prolongations being black, and where the prolongation of a nerve cell goes over into a nerve fiber, it can in these specimens often be followed. The tissues investigated were bits of human cortex from about the central and the calcarine fissures. The general conclusions arrived at were: 1. That the protoplasmic prolongations were not found in connection with nerve fibers. 2. The axis cylinder in most cases branches; it often forms a T, similar to that of the cells of the spinal root ganglia. These branches of the first order may divide again, forming as many as eight subdivisions. Such cells are only from the calcarine region. There is, therefore, a marked distinction between the methods of branching in the two regions examined. 3. The fine network formed by the subdivision of the axis cylinder of cells of the second category (Golgi, Nansen) is not brought out by this method. 4. The fibers forming the superficial and middle horizontal plexuses in the cortex arise from neighboring cells by branches that leave the axis cylinder at right angles.